

Scaled data based on original data using  
LM-79-08 Approved Method: Electrical and Photometric Measurements of Solid-State  
Lighting Products

Test Report Prepared for  
Cooper Lighting Solutions  
(formerly Eaton)

Brand: FAIL-SAFE

Report Number: P241333

Luminaire Tested: **FVS8M-2-LD4-30-3LO-P125-UNV-EDC1**

Issue Date: 3/3/2020



**Test Information**

Test Method: LM-79-08  
Report Number: P241333  
TEST IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-1711-410-13)  
Test Lab: INNOVATION CENTER(G3)  
Issue Date: 3/3/2020  
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)  
Product Line: FAIL-SAFE  
Catalog Number: FVS8M-2-LD4-30-3LO-P125-UNV-EDC1  
Description: FAILSAFE FVS8M LED FIXTURE  
2FT LENGTH, 3-MODULE LED WITH P125 LENS  
Light Source: (126) 3000K CCT, 80 CRI LEDS  
Ballast/Driver: ELECTRONIC DRIVER

**Summary**

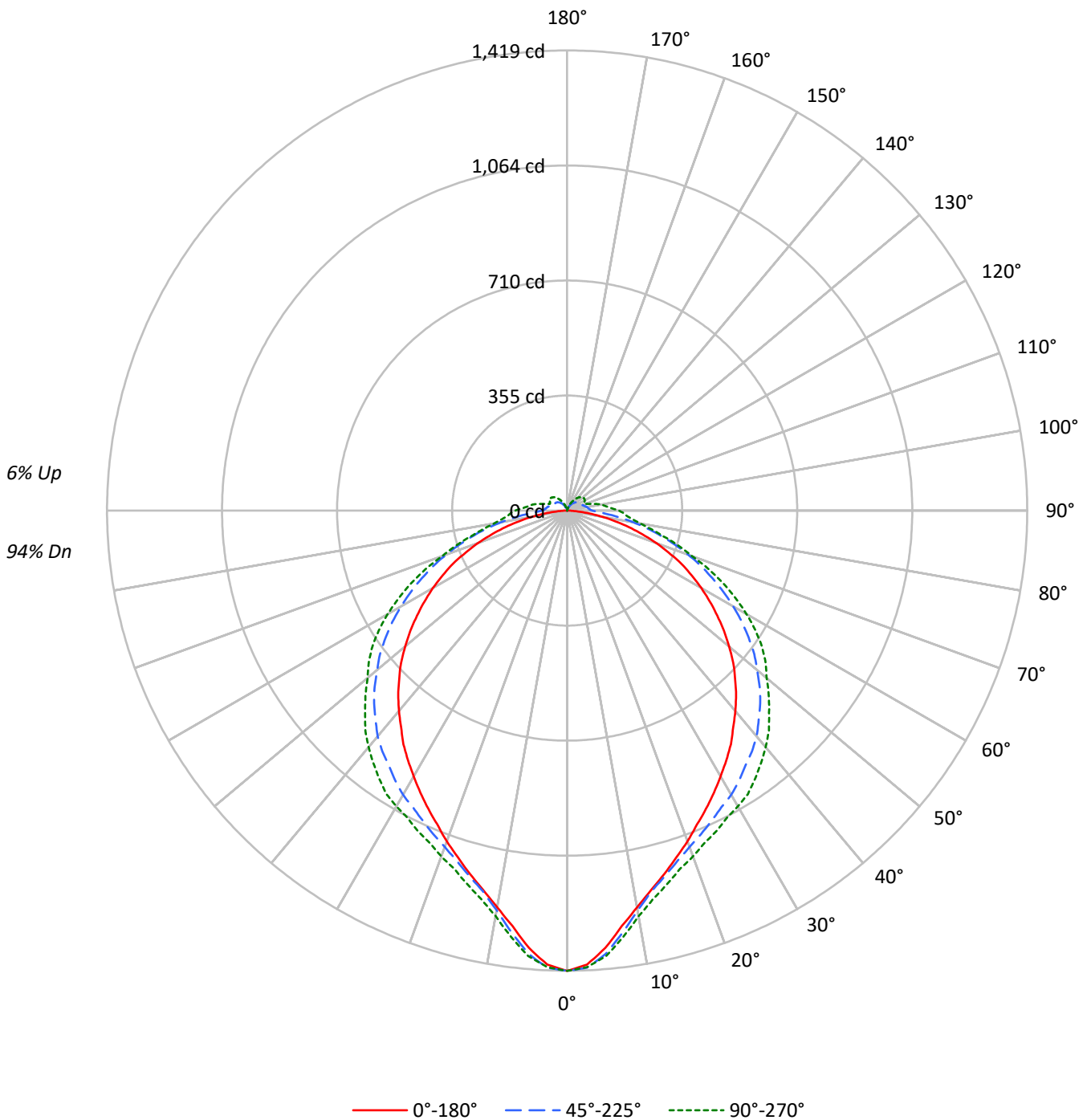
Lumens per Lamp: N/A  
Luminaire Lumens: 3913.0 lumens  
Efficiency: N/A  
Efficacy: 108.7 lumens/watt  
Spacing Criteria (0/90/45): 1 / 1.11 / 1.29  
Luminous Opening: Rectangular w/ Sides (W: 0.65' x L: 1.85' x H: 0.15')  
CIE Type: Direct

Input Watts (W): 36  
Input Voltage (V): 120  
Input Current (Ain): NR  
Voltage Rise (V): NR  
Power Factor: NR  
Total Harmonic Distortion (THDi): NR  
Frequency (hertz): 60  
Stabilization Time: NR  
Operation Time: NR  
Ambient Temperature (°C): NR  
Test Distance: 25 FT

TEST NUMBER: P241333

CATALOG NUMBER: FVS8M-2-LD4-30-3LO-P125-UNV-EDC1

### Luminous Intensity Polar Plot





TEST NUMBER: P241333

CATALOG NUMBER: FVS8M-2-LD4-30-3LO-P125-UNV-EDC1

**COEFFICIENT OF UTILIZATION - ZONAL CAVITY METHOD:**

RF	20				20				20				20				20	
RC	80				70				50				30				10	0
RW	70	50	30	10	70	50	30	10	50	30	10	50	30	10	50	30	10	0
RCR																		
0	118	118	118	118	114	114	114	114	108	108	108	102	102	102	96	96	96	94
1	106	101	97	93	103	98	94	91	93	90	87	88	85	83	84	81	79	77
2	96	88	81	75	93	85	79	73	81	75	71	77	72	68	73	69	66	63
3	88	77	68	62	85	75	67	61	71	64	59	67	62	57	64	59	55	53
4	80	68	59	52	77	66	58	51	63	56	50	60	54	49	57	52	47	45
5	74	61	51	45	71	59	50	44	56	49	43	54	47	42	51	45	41	39
6	68	54	45	39	66	53	45	38	51	43	38	48	42	37	46	40	36	34
7	63	49	40	34	61	48	40	34	46	39	33	44	37	32	42	36	32	30
8	59	45	36	30	57	44	36	30	42	35	30	40	34	29	39	33	28	26
9	55	41	33	27	53	40	32	27	39	32	27	37	31	26	36	30	26	24
10	51	38	30	25	50	37	30	25	36	29	24	34	28	24	33	27	23	22

**AVERAGE LUMINANCE (cd/sqm):**

	0°	45°	90°
0°	12758	12758	12758
5°	12132	12149	12199
10°	11180	11003	11145
15°	10568	10259	10460
20°	10094	9787	10029
25°	9702	9505	9781
30°	9394	9345	9668
35°	9153	9145	9570
40°	8884	9035	9397
45°	8630	8806	9133
50°	8332	8505	8848
55°	7964	8187	8698
60°	7558	7744	8264
65°	7091	7188	7611
70°	6315	6549	6638
75°	5276	5750	5803
80°	3902	4811	5184
85°	1890	3698	5294



TEST NUMBER: P241333

CATALOG NUMBER: FVS8M-2-LD4-30-3LO-P125-UNV-EDC1

**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	126.9	3.2
10°-20°	330.6	8.4
20°-30°	487.0	12.4
30°-40°	597.9	15.3
40°-50°	636.0	16.3
50°-60°	595.1	15.2
60°-70°	471.9	12.1
70°-80°	294.6	7.5
80°-90°	132.2	3.4
90°-100°	71.0	1.8
100°-110°	51.7	1.3
110°-120°	37.8	1.0
120°-130°	33.4	0.9
130°-140°	25.1	0.6
140°-150°	14.8	0.4
150°-160°	6.0	0.2
160°-170°	1.2	0.0
170°-180°	0.0	0.0
0°-30°	944.4	24.1
0°-40°	1542.3	39.4
0°-60°	2773.4	70.9
0°-90°	3672.1	93.8
90°-120°	160.4	4.1
90°-150°	233.7	6.0
90°-180°	241.0	6.2
0°-180°	3913.0	100.0

**CANDELA DISTRIBUTION:**

	0°	22.5°	45°	67.5°	90°	Flux
0°	1419	1419	1419	1419	1419	
5°	1354	1361	1372	1375	1379	125
15°	1160	1161	1166	1178	1192	327
25°	1014	1027	1055	1082	1090	468
35°	880	911	959	1008	1010	550
45°	732	777	842	873	881	565
55°	565	616	683	717	734	506
65°	390	430	494	524	531	382
75°	196	238	299	321	308	209
85°	35	72	124	155	184	45
90°	1	34	77	114	160	2
95°	0	30	67	97	127	0
105°	0	24	55	74	80	0
115°	0	21	45	54	58	0
125°	0	18	42	58	64	0
135°	1	14	36	51	59	0
145°	1	9	26	38	43	0
155°	1	3	13	22	24	0
165°	1	1	3	6	8	0
175°	0	0	0	0	0	0
180°	0	0	0	0	0	0



TEST NUMBER: P241333

CATALOG NUMBER: FVS8M-2-LD4-30-3LO-P125-UNV-EDC1

**CANDELA DISTRIBUTION (FULL):**

	0°	5°	10°	15°	20°	22.5°	25°	30°	35°	40°	45°
0°	1419.3	1419.3	1419.3	1419.3	1419.3	1419.3	1419.3	1419.3	1419.3	1419.3	1419.3
2.5°	1401.4	1403.1	1403.7	1404.3	1404.3	1406.0	1406.0	1407.1	1408.9	1410.0	1410.6
5°	1353.8	1357.3	1354.4	1357.3	1359.6	1360.8	1362.5	1363.7	1367.1	1370.6	1371.8
7.5°	1291.8	1292.9	1294.7	1296.4	1298.7	1298.1	1299.3	1303.4	1307.4	1312.6	1312.1
10°	1241.9	1241.9	1241.9	1241.9	1241.9	1243.6	1244.2	1246.0	1248.9	1254.1	1251.2
12.5°	1197.8	1199.0	1200.7	1200.2	1199.0	1198.4	1196.7	1199.0	1199.6	1203.1	1201.9
15°	1159.6	1157.8	1159.6	1160.7	1159.6	1160.7	1160.2	1161.9	1161.3	1162.5	1166.0
17.5°	1120.7	1124.8	1126.0	1123.1	1124.2	1125.4	1126.0	1125.4	1125.4	1130.0	1132.3
20°	1085.4	1087.1	1087.1	1086.5	1088.8	1089.4	1092.3	1092.3	1095.2	1101.0	1103.3
22.5°	1047.1	1050.6	1052.9	1052.3	1058.7	1058.7	1059.3	1061.6	1069.7	1072.0	1079.6
25°	1014.1	1017.5	1018.7	1021.0	1025.6	1026.8	1026.8	1036.7	1039.6	1046.5	1054.6
27.5°	980.4	982.7	983.9	988.0	995.5	995.5	998.4	1008.3	1014.6	1022.7	1030.9
30°	946.2	951.4	951.4	957.8	964.2	965.9	972.9	981.6	992.0	999.0	1012.3
32.5°	913.2	915.5	917.8	927.7	934.6	939.8	945.1	956.1	964.8	976.9	986.8
35°	880.1	883.0	885.3	895.8	902.2	910.8	917.2	931.1	939.8	951.4	959.0
37.5°	841.3	845.9	851.1	859.2	872.0	879.0	884.8	901.6	911.4	921.9	935.8
40°	807.1	811.7	817.5	826.2	840.1	845.3	852.9	866.8	883.0	895.2	909.1
42.5°	771.1	776.3	782.1	792.6	803.6	810.5	819.2	833.7	850.0	865.0	874.3
45°	732.3	736.9	744.5	754.3	768.2	776.9	783.9	801.3	814.0	829.7	841.9
47.5°	695.2	697.5	705.6	718.9	731.1	741.6	748.5	763.6	780.4	792.0	805.3
50°	651.7	654.6	663.3	676.6	692.8	702.7	706.8	725.3	739.2	754.3	764.2
52.5°	609.4	614.0	624.4	636.6	651.7	660.4	667.9	681.3	699.2	712.6	727.6
55°	565.3	571.1	580.4	593.7	607.0	615.7	624.4	639.5	655.7	671.4	683.0
57.5°	521.2	527.0	536.3	549.6	563.0	569.9	578.6	594.3	612.8	627.9	638.9
60°	477.7	481.8	491.7	503.3	516.6	525.3	531.7	547.9	565.3	578.6	591.4
62.5°	432.5	436.6	444.7	455.7	470.8	478.3	484.1	500.9	517.2	529.9	543.8
65°	389.6	389.6	399.5	408.8	421.5	430.2	438.9	453.4	467.3	481.2	494.0
67.5°	338.0	343.2	350.2	360.6	375.1	382.7	391.4	405.3	418.0	434.8	447.0
70°	292.2	294.5	302.7	314.2	325.8	333.4	342.1	354.8	369.3	384.4	396.6
72.5°	242.9	247.6	254.5	267.9	277.1	284.7	292.8	306.1	320.0	335.1	347.3
75°	196.5	200.6	207.6	218.0	230.2	237.7	244.1	258.0	271.3	288.2	298.6
77.5°	152.5	154.2	161.8	171.6	186.7	190.8	198.3	211.0	226.1	239.5	252.2
80°	109.0	112.5	118.3	127.6	140.9	147.3	153.6	167.6	180.3	194.8	206.4
82.5°	68.4	73.6	78.3	90.4	100.9	106.1	113.6	125.8	140.3	152.5	162.9
85°	34.8	38.8	45.8	54.5	66.1	72.5	77.7	91.0	103.2	114.8	124.1
87.5°	13.3	16.2	22.0	31.3	41.7	47.0	53.3	64.4	76.0	85.2	94.5
90°	0.6	4.1	10.4	19.1	29.0	34.2	39.4	50.4	60.3	69.0	77.1
92.5°	0.0	2.9	8.7	17.4	26.7	31.3	36.5	45.8	53.9	62.0	70.2
95°	0.0	2.3	8.1	16.2	24.9	30.1	34.8	43.5	51.6	59.1	67.3
97.5°	0.0	2.3	7.5	15.7	24.4	29.0	33.0	41.2	48.7	56.8	64.4
100°	0.0	2.3	7.5	15.1	23.2	27.3	31.3	38.8	47.0	54.5	61.5
102.5°	0.0	1.7	7.0	13.9	22.0	26.1	29.6	37.1	44.6	51.6	58.6
105°	0.0	1.7	6.4	13.3	20.9	24.4	28.4	35.9	42.9	49.3	55.1
107.5°	0.0	1.7	6.4	12.8	19.7	23.8	27.3	34.2	41.2	47.0	52.2
110°	0.0	1.2	5.8	12.2	19.1	22.6	26.1	33.0	39.4	44.6	49.9



TEST NUMBER: P241333

CATALOG NUMBER: FVS8M-2-LD4-30-3LO-P125-UNV-EDC1

**CANDELA DISTRIBUTION (continued):**

	0°	5°	10°	15°	20°	22.5°	25°	30°	35°	40°	45°
112.5°	0.0	1.2	5.2	11.6	18.0	21.5	24.9	31.9	37.7	42.9	47.0
115°	0.0	1.2	5.2	11.0	17.4	20.9	24.4	30.7	36.5	41.2	45.2
117.5°	0.0	1.2	4.6	10.4	16.8	20.3	23.2	29.6	35.4	40.0	44.1
120°	0.0	1.2	4.6	9.9	16.2	19.7	22.6	29.0	34.2	39.4	43.5
122.5°	0.0	0.6	4.1	9.3	15.7	18.6	22.0	27.8	33.6	38.8	42.9
125°	0.0	0.6	4.1	8.7	15.1	18.0	21.5	27.3	33.0	38.3	42.3
127.5°	0.0	0.6	3.5	8.1	13.9	16.8	20.3	26.1	31.9	37.1	41.2
130°	0.0	0.6	2.9	7.5	13.3	16.2	19.1	24.9	30.1	35.4	39.4
132.5°	0.6	0.6	2.9	7.0	12.2	15.1	18.0	23.2	28.4	33.6	37.7
135°	0.6	0.6	2.3	6.4	11.0	13.9	16.2	22.0	26.7	31.9	35.9
137.5°	0.6	0.6	2.3	5.8	10.4	12.8	15.1	20.3	24.9	29.6	33.6
140°	0.6	0.6	1.7	5.2	9.3	11.6	13.9	18.6	23.2	27.3	31.3
142.5°	0.6	0.6	1.2	4.1	8.1	9.9	12.2	16.8	20.9	24.9	28.4
145°	0.6	0.6	1.2	3.5	7.0	8.7	10.4	14.5	18.6	22.0	26.1
147.5°	0.6	0.6	0.6	2.9	5.2	7.0	8.7	12.8	16.2	19.7	23.2
150°	0.6	0.6	0.6	1.7	4.1	5.8	7.0	10.4	13.3	16.8	19.7
152.5°	0.6	0.6	0.6	1.2	3.5	4.1	5.8	8.1	11.0	13.9	16.8
155°	0.6	0.6	0.6	1.2	2.3	2.9	4.1	6.4	8.7	11.0	13.3
157.5°	0.6	0.6	0.6	0.6	1.7	2.3	2.9	4.6	6.4	8.1	10.4
160°	0.6	0.6	0.6	0.6	1.2	1.2	1.7	2.9	4.6	5.8	7.5
162.5°	0.6	0.6	0.6	0.6	0.6	0.6	1.2	1.7	2.9	4.1	5.2
165°	0.6	0.6	0.6	0.6	0.6	0.6	0.6	1.2	1.7	2.3	2.9
167.5°	0.6	0.6	0.6	0.0	0.0	0.0	0.0	0.6	0.6	1.2	1.7
170°	0.6	0.6	0.6	0.0	0.0	0.0	0.0	0.0	0.0	0.6	0.6
172.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
175°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
177.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
180°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0



TEST NUMBER: P241333

CATALOG NUMBER: FVS8M-2-LD4-30-3LO-P125-UNV-EDC1

**CANDELA DISTRIBUTION (continued):**

	50°	55°	60°	65°	67.5°	70°	75°	80°	85°	90°
0°	1419.3	1419.3	1419.3	1419.3	1419.3	1419.3	1419.3	1419.3	1419.3	1419.3
2.5°	1411.2	1410.6	1411.2	1410.6	1410.6	1410.0	1410.6	1410.0	1408.9	1408.9
5°	1371.8	1375.8	1376.4	1377.6	1374.7	1376.4	1376.4	1376.4	1376.4	1378.7
7.5°	1315.5	1321.3	1321.3	1321.3	1324.2	1324.8	1326.6	1326.6	1326.0	1326.0
10°	1255.8	1260.5	1262.2	1262.8	1266.3	1266.3	1269.2	1268.0	1269.7	1269.7
12.5°	1202.5	1204.8	1211.2	1217.0	1216.4	1219.3	1222.2	1224.5	1222.8	1226.3
15°	1167.1	1171.2	1174.1	1175.8	1178.1	1181.6	1184.5	1188.0	1189.1	1192.0
17.5°	1132.3	1138.1	1143.3	1149.1	1152.0	1153.2	1154.9	1156.7	1158.4	1158.4
20°	1109.1	1113.8	1117.8	1120.2	1123.1	1126.0	1126.5	1130.0	1131.2	1134.6
22.5°	1085.4	1088.8	1094.1	1099.9	1101.6	1103.9	1105.1	1106.8	1109.7	1108.6
25°	1062.2	1068.6	1075.5	1078.4	1082.5	1085.9	1088.3	1091.7	1092.9	1090.0
27.5°	1041.3	1045.4	1058.7	1065.1	1068.0	1068.0	1068.0	1071.5	1070.9	1067.4
30°	1018.1	1029.7	1039.0	1041.9	1044.2	1047.1	1050.6	1052.3	1051.2	1052.9
32.5°	996.7	1004.8	1017.0	1025.1	1027.4	1030.3	1032.0	1034.9	1036.1	1036.7
35°	972.3	984.5	999.6	1003.6	1007.7	1011.7	1012.9	1011.2	1013.5	1010.0
37.5°	947.4	964.2	967.7	978.1	979.8	979.8	980.4	981.6	982.7	981.6
40°	920.7	926.5	939.3	942.7	943.9	945.6	949.1	949.7	950.3	952.6
42.5°	886.5	896.4	902.2	913.7	914.3	914.3	914.3	916.1	919.0	920.7
45°	848.2	859.2	867.4	873.2	872.6	875.5	878.4	878.4	880.1	880.7
47.5°	814.6	819.8	824.5	830.3	834.9	834.9	836.6	839.0	841.3	843.6
50°	772.9	782.1	787.4	793.2	792.0	794.3	800.1	803.0	801.8	803.0
52.5°	734.6	741.6	750.2	753.7	757.8	760.7	761.3	765.9	769.4	771.7
55°	694.0	699.2	707.9	717.2	717.2	718.4	725.3	729.4	734.0	734.0
57.5°	649.4	658.1	667.9	670.8	675.5	680.7	685.9	687.6	689.4	688.8
60°	600.1	612.3	621.5	627.9	630.2	632.6	632.6	638.9	639.5	639.5
62.5°	554.9	565.3	572.3	574.6	575.2	578.6	579.8	582.1	580.9	585.6
65°	505.6	514.9	519.5	521.8	523.6	523.0	524.7	527.0	531.7	531.1
67.5°	459.2	462.7	467.3	470.8	470.8	473.7	475.4	478.3	473.1	472.5
70°	408.2	415.7	418.0	424.4	422.1	422.1	417.4	413.4	408.2	409.3
72.5°	358.3	364.7	371.6	369.3	369.3	367.6	364.1	360.6	357.2	359.5
75°	308.4	317.1	321.2	320.6	320.6	319.5	315.4	313.1	310.8	307.9
77.5°	263.2	267.9	273.1	275.4	276.0	275.4	271.3	267.3	266.7	265.5
80°	214.5	220.3	225.5	229.6	230.2	230.2	229.0	229.0	227.3	228.4
82.5°	169.9	176.3	183.8	188.4	189.6	192.5	193.6	195.4	198.9	201.8
85°	130.5	139.7	146.7	152.5	154.8	156.5	162.9	170.5	178.6	183.8
87.5°	103.2	111.3	119.4	125.8	129.3	133.9	141.5	152.5	165.2	173.9
90°	85.8	93.9	102.6	110.2	113.6	117.7	127.0	138.0	153.1	160.0
92.5°	77.7	86.4	93.3	99.7	103.2	106.7	115.4	124.7	135.7	140.3
95°	74.8	81.2	87.0	93.9	97.4	101.5	108.4	116.0	122.9	127.0
97.5°	70.7	77.1	83.5	89.3	92.8	95.7	100.9	107.8	113.6	116.0
100°	67.8	73.6	78.9	84.1	87.0	89.3	95.7	102.0	105.5	107.3
102.5°	64.4	69.6	74.2	78.9	81.2	83.5	88.7	92.2	93.3	93.3
105°	60.3	65.5	69.6	73.6	74.2	76.0	78.9	80.0	80.0	80.0
107.5°	56.8	60.9	64.4	66.7	67.3	67.8	68.4	68.4	67.3	67.3
110°	53.9	56.8	59.1	60.3	59.7	60.3	60.3	59.7	59.7	59.7





TEST NUMBER: P241333

CATALOG NUMBER: FVS8M-2-LD4-30-3LO-P125-UNV-EDC1

**CANDELA DISTRIBUTION (continued):**

	50°	55°	60°	65°	67.5°	70°	75°	80°	85°	90°
112.5°	51.0	53.3	54.5	55.7	55.7	55.7	55.7	56.8	56.8	56.8
115°	48.7	51.0	52.8	53.9	53.9	54.5	55.7	57.4	58.0	58.0
117.5°	47.5	50.4	52.2	53.9	55.1	55.7	58.0	59.1	60.3	60.3
120°	47.0	50.4	53.3	55.7	56.8	58.0	59.7	61.5	62.6	62.6
122.5°	47.0	50.4	53.9	56.2	58.0	58.6	60.9	62.6	63.8	63.8
125°	46.4	50.4	53.9	56.8	58.0	59.1	60.9	62.6	63.8	64.4
127.5°	45.2	49.3	52.8	55.7	56.8	58.6	60.3	62.0	63.2	63.8
130°	43.5	47.5	51.0	53.9	55.7	56.8	59.1	60.9	62.0	62.0
132.5°	41.7	45.8	48.7	52.2	53.9	55.1	57.4	59.1	60.3	60.3
135°	40.0	43.5	46.4	49.9	51.0	52.8	55.1	56.8	58.0	58.6
137.5°	37.7	41.2	44.1	47.0	48.7	49.9	52.2	53.9	55.1	55.7
140°	34.8	38.3	41.2	44.1	45.8	47.0	48.7	50.4	51.6	51.6
142.5°	31.9	35.4	38.3	40.6	41.7	42.9	44.6	46.4	47.0	47.5
145°	29.0	31.9	34.8	37.1	37.7	38.8	40.6	41.7	42.9	42.9
147.5°	25.5	28.4	30.7	32.5	33.6	34.2	35.9	37.1	37.7	38.3
150°	22.0	24.9	26.7	28.4	29.6	30.1	31.3	32.5	33.0	33.6
152.5°	19.1	20.9	23.2	24.4	25.5	26.1	27.3	27.8	28.4	28.4
155°	15.7	17.4	19.1	20.3	21.5	21.5	22.6	23.2	23.8	23.8
157.5°	12.2	13.9	15.7	16.8	17.4	18.0	18.6	19.1	19.1	19.7
160°	8.7	10.4	12.2	12.8	13.3	13.9	14.5	14.5	15.1	15.1
162.5°	6.4	7.5	8.7	9.3	9.9	9.9	10.4	11.0	11.0	11.0
165°	4.1	4.6	5.8	6.4	6.4	7.0	7.0	7.5	7.5	7.5
167.5°	1.7	2.3	2.9	3.5	3.5	4.1	4.1	4.1	4.6	4.1
170°	0.6	0.6	1.2	1.2	1.2	1.2	1.7	1.7	1.7	1.7
172.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
175°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
177.5°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
180°	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0

(END OF REPORT)